

Decimals in Words

Jen Kershaw, M.ed

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AUTHOR

Jen Kershaw, M.ed

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CONCEPT

1

Decimals in Words

Here you'll learn how to read and write decimals to the ten - thousandths place.

Julie has figured out how to identify decimals and how to determine the place value of certain decimals. She also knows how to write one out in expanded notation. With confidence, she was able to finish this section of her homework.

What about writing decimals? Do you know how to do that?

Well, the next part of Julie's homework requires that she know how to write a decimal out in words. Here is the first decimal in this part of the homework.

.567

Julie isn't sure how to write this one out.

This Concept is all about reading and writing decimals. This is exactly what is needed for Julie to be successful in her assignment.

Guidance

We have been learning all about figuring out the value of different decimals. We have used place value to write them, we have used pictures and we have stretched them out. Now it is time to learn to read and write them directly. Let's start with reading decimals.

How do we read a decimal?

We read a decimal by using the words that show the place value of the last digit of the decimal.

.45

To help us read this decimal, we can put it into our place value chart.

TABLE 1.1:

Hundred	Tens	Ones	Tenths	Hundredths	Thousandths	Ten Thousandths
		.	4	5		

We read this decimal by using the place value of the last digit to the right of the decimal point. Normally, we would read this number as **forty-five**. Because it is a decimal, we read forty-five hundredths. The last digit is a five and it is in the hundredths place.

Can we use place value to write the number too?

Yes we can. We write the number as we normally would.

Forty-five

Next, we add the place value of the last digit to the right of the decimal point.

Forty-five hundredths

Our answer is forty-five hundredths.

We can use this method to read and write any decimal. What about a decimal with more digits?

.5421

First, let's put this number in our place value chart.

TABLE 1.2:

Hundred	Tens	Ones	Tenths	Hundredths	Thousandths	Ten Thousandths
		.	5	4	2	1

First, let's read the number. We can look at the number without the decimal. It would read:

Five thousand four hundred twenty-one

Next we add the place value of the last digit

Ten thousandth

Five thousand four hundred and twenty-one ten thousandths

This is our answer.

It is also the way we write the number in words too. Notice that is it very important that we add the THS to the end of the place value when working with decimals.

Now let's practice. Write each decimal in words.

Example A

.7

Solution: Seven Tenths

Example B

.765

Solution: Seven Hundred and Sixty - Five Thousandths

Example C

.2219

Solution: Two Thousand Two Hundred and Nineteen Ten - Thousandths

Do you have it? Now it's time to help Julie with this part of her math homework. Here is the original problem once again.

Julie has figured out how to identify decimals and how to figure out the place value of certain decimals. She also knows how to write one out in expanded notation. With confidence, she was able to finish this section of her homework.

What about writing decimals? Do you know how to do that?

Well, the next part of Julie's homework requires that she know how to write a decimal out in words. Here is the first decimal in this part of the homework.

.567

Julie isn't sure how to write this one out.

First, let's read the number as if it wasn't a decimal.

Five hundred and sixty - seven.

But because this is a decimal, we have to add the place value of the last digit to the right. This is a seven in the thousandths place.

Our answer is five hundred and sixty - seven thousandths.

Vocabulary

Here are the vocabulary words in this Concept.

Whole number a number that represents a whole quantity

Decimal a part of a whole

Decimal point the point in a decimal that divides parts and wholes

Expanded form writing out a decimal the long way to represent the value of each place value in a number

Guided Practice

Here is one for you to try on your own.

Write the following decimal in words.

.1345

Answer

First, we can write the decimal out as if it wasn't a decimal.

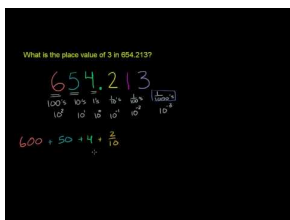
One thousand three hundred and forty - five

Next, we add the place value of the last digit which is a five in the ten - thousandths place.

Our answer is one thousand three hundred and forty - five ten - thousandths.

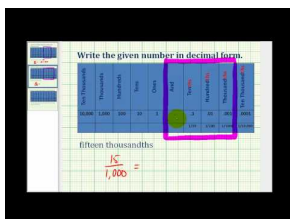
Video Review

Here are videos for review.

**MEDIA**

Click image to the left for more content.

[KhanAcademyDecimalPlace Value](#)

**MEDIA**

Click image to the left for more content.

James Sousa, Write a Number in Decimal Notation from Words

Practice

Directions: Write out each decimal in words.

1. .5
2. .8
3. .21
4. .18
5. .4
6. .56
7. .93
8. .801
9. .834
10. .355
11. .155
12. .624
13. .5623
14. .9783
15. .5671
16. .2134
17. .0123
18. .0098
19. .0008
20. .0001